

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 2 of 13

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JUL 27 2007

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of claims:

1 (original): A method of performing an incision on a skin surface using a computer aided surgical navigation system, the system comprising: a sensor adapted to sense the position and orientation of at least one surgical reference associated with a structure to be referenced; and computer functionality adapted to receive information from the sensor about position and orientation of the surgical reference and generate information corresponding to the position and orientation of the structure to be referenced to which the surgical reference is associated, the method of guiding the surgical incision comprising:

(a) associating at least one first surgical reference with a portion of an individual's bony anatomy and skin proximate the bony anatomy;

(b) registering the position and orientation of the portion of the individual's bony anatomy and skin proximate the bony anatomy with the computer aided surgical navigation system such that the computer functionality can generate information corresponding to the position and orientation of the individual's bony anatomy and skin proximate the bony anatomy by receiving information from the sensor sensing the position and orientation of the first surgical reference;

(c) calculating a suggested incision path and length based upon the information generated by the computer functionality corresponding to the position and orientation of the individual's bony anatomy and skin proximate the bony anatomy;

(d) associating at least one second surgical reference with an incision device, wherein the incision device is a cutting device or a marking device;

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 3 of 13

(e) registering the position of the incision device with the computer aided surgical navigation system such that the computer functionality can generate information corresponding to the position of the incision device by receiving information from the sensor sensing the position and orientation of the second surgical reference; and

(f) using the incision device in the performance of the incision, wherein the computer aided surgical navigation system provides guidance based on comparing the suggested incision path and length with the information corresponding to the position and orientation of the incision device as generated by the computer functionality by receiving information from the sensor sensing the position and orientation of the second surgical reference.

2 (original): The method of performing an incision on a skin surface using a computer aided surgical navigation system of Claim 1, wherein the computer aided surgical navigation system providing guidance further comprises a display associated with the computer aided surgical navigation system displaying the suggested incision path and length and the position of the incision device.

3 (original): The method of performing an incision on a skin surface using a computer aided surgical navigation system of Claim 2, wherein displaying the suggested incision path and length and the position of the incision device further comprises a semi-transparent display displaying the suggested incision path and length and the position of the of the incision device or a monitor displaying the suggested incision path and length and the position of the of the incision device.

4 (original): The method of performing an incision on a skin surface using a computer aided surgical navigation system of Claim 1, further comprising providing feedback if the incision device deviates from the suggested incision.

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 4 of 13

5 (currently amended): The method of performing an incision on a skin surface using a computer aided surgical navigation system of Claim 4, wherein providing feedback comprises providing a visible warning if the incision device deviates from the suggested incision.

6 (currently amended): The method of performing an incision on a skin surface using a computer aided surgical navigation system of Claim 5, wherein providing a visible warning if the incision device deviates from the suggested incision comprises displaying a comparison of the suggested incision path and length with at least a portion of a path traveled by the incision device.

7 (currently amended): The method of performing an incision on a skin surface using a computer aided surgical navigation system of Claim 5, further comprising projecting an image of the suggested incision onto the individual; and wherein providing a visible warning if the incision device deviates from the suggested incision comprises altering the image if the incision device deviates from the suggested incision.

8 (currently amended): The method of performing an incision on a skin surface using a computer aided surgical navigation system of Claim 4, wherein providing feedback further comprises providing an audible warning if the incision device deviates from the suggested incision path.

9 (original): The method of performing an incision on a skin surface using a computer aided surgical navigation system of Claim 1, further comprising: using the incision to access the interior of the individual to install an orthopaedic implant; and installing the orthopaedic implant.

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 5 of 13

10 (original): A system for guiding an incision on a skin surface, comprising:

- (a) a computer aided surgical navigation system, comprising:
 - (i) a sensor adapted to sense the position and orientation of at least one surgical reference associated with a structure to be referenced; and
 - (ii) computer functionality adapted to receive information from the sensor about position and orientation of the surgical reference and generate information corresponding to the position and orientation of the structure to be referenced to which the surgical reference is associated;
- (b) at least one first surgical reference adapted to be associated with a portion of an individual's bony anatomy and skin proximate the bony anatomy such that the position and orientation of the portion of the individual's bony anatomy and skin proximate the bony anatomy can be registered with the computer aided surgical navigation system, the computer functionality adapted to generate information corresponding to the position and orientation of the individual's bony anatomy and skin proximate the bony anatomy by receiving information from the sensor sensing the position and orientation of the first surgical reference, the computer functionality adapted to calculate a suggested incision path and length on the skin proximate the bony anatomy based upon the information generated by the computer functionality corresponding to the position and orientation of the individual's bony anatomy;
- (c) at least one second surgical reference adapted to be associated with an incision device, wherein the incision device is a cutting device or a marking device, the at least one second surgical reference adapted to be registered with the computer aided surgical navigation system, the computer functionality adapted to generate information corresponding to the position of the incision device by receiving information from the sensor sensing the position and orientation of the second surgical reference; and

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 6 of 13

(d) wherein the computer aided surgical navigation system is adapted to compare the suggested incision path and length with the information corresponding to the position of the incision device.

11 (original): The system for guiding an incision on a skin surface of Claim 10, further comprising a display, the display adapted to compare the suggested incision path and length with the information concerning the position of the incision device by displaying the suggested incision path and length and the position of the incision device.

12 (original): The system for guiding an incision on a skin surface of Claim 11, wherein the display comprises a semi-transparent display or a monitor.

13 (original): The system for guiding an incision on a skin surface of Claim 12, wherein the display comprises a semi-transparent display, the semi-transparent display associated with at least one third surgical reference, the at least one third surgical reference adapted to be registered with the computer aided surgical navigation system, the computer functionality adapted to generate information corresponding to the position and orientation of the semi-transparent display by receiving information from the sensor sensing the position and orientation of the third surgical reference.

14 (original): The system for guiding an incision on a skin surface of Claim 10, wherein the computer aided surgical navigation system further comprises feedback functionality adapted to provide feedback if the incision device deviates from the suggested incision path.

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 7 of 13

15 (original): The system for guiding an incision on a skin surface of Claim 14, wherein the feedback functionality is adapted to provide visual feedback if the incision device deviates from the suggested incision path.

16 (original): The system for guiding an incision on a skin surface of Claim 15, wherein the feedback functionality comprises a display adapted to display the suggested incision and a path traveled by the incision device.

17 (original): The system for guiding an incision on a skin surface of Claim 15, further comprising a projector, the projector: adapted to project an image of the suggested incision path onto the individual; and adapted to provide visual feedback if the incision device deviates from the suggested incision path by altering the image if the incision device deviates from the suggested incision path.

18 (original): The system for guiding an incision on a skin surface of Claim 15, wherein the feedback functionality is adapted to provide audible feedback if the incision device deviates from the suggested incision path.

19 (original): A system for guiding an incision on a skin surface, comprising:

- (a) a computer aided surgical navigation system, comprising:
 - (i) a sensor adapted to sense the position and orientation of at least one surgical reference associated with a structure to be referenced; and
 - (ii) computer functionality adapted to receive information from the sensor about position and orientation of the surgical reference and generate information corresponding to the position and orientation of the structure to be referenced to which the surgical reference is associated;
- (b) at least one first surgical reference adapted to be associated with a portion of an individual's bony anatomy and skin proximate the bony anatomy such

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 8 of 13

that the position and orientation of the portion of the individual's bony anatomy and skin proximate the bony anatomy can be registered with the computer functionality, the computer functionality adapted to generate information corresponding to the position and orientation of the individual's bony anatomy and skin proximate the bony anatomy by receiving information from the sensor sensing the position and orientation of the first surgical reference, the computer functionality adapted to calculate a suggested incision path and length based upon the information generated by the computer functionality corresponding to the position and orientation of the individual's bony anatomy and skin proximate the bony anatomy;

(c) at least one second surgical reference adapted to be associated with an incision device, wherein the incision device is a cutting device or a marking device, the at least one second surgical reference and the incision device adapted to be registered with the computer aided surgical navigation system, the computer functionality adapted to generate information corresponding to the position of the incision device by receiving information from the sensor sensing the position and orientation of the second surgical reference;

(d) wherein the computer aided surgical navigation system is adapted to compare the suggested incision with the information corresponding to the position of the incision device; and

(e) wherein the computer aided surgical navigation system further comprises feedback functionality adapted to provide feedback if the incision device deviates from the suggested incision.

20 (original): The system for guiding an incision on a skin surface of Claim 19, further comprising a projector, the projector adapted to project an image of the suggested incision path onto the individual and adapted to provide visual feedback by altering the image if the incision device deviates from the suggested incision path.

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 9 of 13

21 (original): The system for guiding an incision on a skin surface of Claim 19, further comprising a display, the display adapted to display an image of the suggested incision path and display at least a portion of a path followed by the incision device.

22 (original): A system for guiding an incision on a skin surface, comprising:

- (a) a computer aided surgical navigation system, comprising:
 - (i) a sensor adapted to sense the position and orientation of at least one surgical reference associated with a structure to be referenced; and
 - (ii) computer functionality adapted to receive information from the sensor about position and orientation of the surgical reference and generate information corresponding to the position and orientation of the structure to be referenced to which the surgical reference is associated;
- (b) at least one first surgical reference adapted to be associated with a portion of an individual's bony anatomy and skin proximate the bony anatomy such that the position and orientation of the portion of the individual's bony anatomy and skin proximate the bony anatomy can be registered with the computer functionality, the computer functionality adapted to generate information corresponding to the position and orientation of the individual's bony anatomy and skin proximate the bony anatomy by receiving information from the sensor sensing the position and orientation of the first surgical reference, the computer functionality adapted to calculate a suggested incision path and length based upon the information generated by the computer functionality corresponding to the position and orientation of the individual's bony anatomy and skin proximate the bony anatomy;
- (c) at least one second surgical reference adapted to be associated with an indicator device, the at least one second surgical reference and indicator device adapted to be registered with the computer aided surgical navigation system, the

Application No. 10/760,999
Amendment Dated July 27, 2007
Reply to Office Action of June 28, 2007
Page 10 of 13

computer functionality adapted to generate information corresponding to the position of the indicator device by receiving information from the sensor sensing the position and orientation of the second surgical reference; and

(d) wherein the computer aided surgical navigation system assists the indicator device in outputting the suggested incision path and length onto the skin surface based upon the information corresponding to the position of the indicator device and the information corresponding to the position and orientation of the individual's bony anatomy and skin proximate the bony anatomy.

23 (original): The system for guiding an incision on a skin surface of Claim 22, wherein the indicator device comprises a marking device.

24 (original): The system for guiding an incision on a skin surface of Claim 22, wherein the indicator device comprises a projector adapted to project an image of the suggested incision path onto the individual.